The following replacement claims are respectfully submitted:

1. (Amended) A method for manufacturing a capacitor of a semiconductor

device, comprising:

forming a storage electrode over a semiconductor substrate;

forming a high dielectric layer over the storage electrode;

forming a plate electrode over the high dielectric layer;

performing a first post-annealing of the semiconductor substrate under an inert atmosphere at a first temperature; and

performing a second post-annealing of the semiconductor substrate, after the first post-annealing, at a second temperature lower than the first temperature,

the first and second post-annealings being performed in-situ.

9. (Amended) A method for manufacturing a capacitor of a semiconductor

device, comprising:

forming a storage electrode over a semiconductor substrate;

forming a high dielectric layer over the storage electrode;

forming a plate electrode over the high dielectric layer;

performing a first post annealing of the semiconductor substrate under an inert

atmosphere; and

performing a second post-annealing of the semiconductor substrate, after the first post-annealing, at a second temperature lower than the first temperature,

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the first and second post-annealings being performed after the forming of the plate electrode.

12. (Amended) A method for manufacturing a capacitor of a semiconductor device, comprising:

forming a storage electrode over a semiconductor substrate;

forming a high dielectric layer over the storage electrode;

forming a plate electrode over the high dielectric layer;

performing a first post-annealing of the semiconductor substrate under an inert atmosphere at a first temperature;

performing a second post-annealing of the semiconductor substrate, after the first post-annealing, at a second temperature lower than the first temperature; and forming an interdielectric layer over the plate electrode,

the first and second post-annealings being performed after the forming of the interdielectric ayer.

15. (Amended) A method for manufacturing a capacitor of a semiconductor device in which a storage electrode, a high dielectric layer, a plate electrode, and an interdielectric layer are sequentially formed on a semiconductor substrate, further comprising:

performing a first post-annealing of the semiconductor substrate under an inert

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atmosphere at a first temperature; and

performing a second post-annealing of the semiconductor substrate, after the first post-annealing, at a second temperature lower than the first temperature,

the first and second post-annealings being performed after forming of the plate electrode.